

## Additions to the fish fauna of Christmas Island, Indian Ocean

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Apart from a paper by Regan (1909) and a few scattered references in faunal works dealing with the Indo-Australian region, little is known of the fishes of Christmas Island. The small collection made by Dr. C. A. Gibson-Hill between 1938 and 1940 from this island is, therefore, of some interest as although only eighteen species are represented, seventeen of these are new records for this locality. So far as is known all the specimens were taken on the edge of the fringing reef. A further twenty-five species representing new records for Christmas Island have also been listed. The local Malayan name has been given in the few instances where this was available.

A bibliography of the fauna and flora of this island, published before the end of 1947, is given by Gibson-Hill (1949).

My thanks are due to Mr. N. B. Marshall for the opportunity of working on this collection, and to Dr. C. A. Gibson-Hill for presenting this interesting collection to the museum.

### Order BERYCOMORPHI

#### Family Holocentridae

##### *Holocentrum caudimaculatum* Rüppell.

1 specimen of 182 mm.

Both Schultz (1943) and Weber and de Beaufort (1929) give the dorsal count for this species as XI.14. In the Christmas Island specimen the dorsal count is XI.15. The number of gill-rakers on the anterior arch is 7+1+13.

This specimen does not show the characteristic silvery patch on the caudal peduncle.

##### *Holocentrum microstoma* Günther.

1 specimen of 141 mm.

##### *Holocentrum tiereoides* Bleeker.

1 specimen of 156 mm.

Weber and de Beaufort (1929) state that there are 7 to 8 transverse rows of scales on the pre-operculum, but in the specimen examined by me there are 5 transverse rows of scales only.

FISH OF CHRISTMAS ISLAND

*Myripristis murdjan* (Forsk.).  
2 specimens of 172 and 176 mm.

Ikan Megintib.

Order PERCOMORPHI

Suborder Percoidea

Division Perciformes

Family Serranidae

*Epinephelus merra* Bloch.  
2 specimens of 190 and 200 mm.

Ikan Kerapu Checha.

Family Kuhliidae

*Kuhlia taeniura* (C. V.).  
2 specimens of 146 and 159 mm.

Family Priacanthidae

*Priacanthus cruentatus* (Lacépède).  
2 specimens of 190 and 200 mm.

In the smaller of these two specimens the anal count is II.14 and in the larger III.13.

Family Lutianidae

*Lutianus vaiigiensis* (Quoy and Gaimard).  
1 specimen of 126 mm.

*Aphareus furcatus* (Lacépède).  
1 specimen of 165 mm.

Family Chaetodontidae

*Chaetodon citrinellus* C. V.  
3 specimens ranging from 94 to 101 mm.

Ikan Karang.

Division Pomacentrifformes

Family Pomacentridae

*Abudefduf saxatilis* (Linnaeus).  
2 specimens of 113 and 119 mm.

Mus. 23, 1950.

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Division Labriformes

Family Labridae

*Gomphosus caeruleus* Lacépède.

1 specimen of 175 mm.

Suborder Acanthuroidea

Family Acanthuridae

*Acanthurus triostegus* (Linnaeus).

3 specimens ranging from 114 to 129 mm.

The dorsal ray counts of these specimens are IX.23-24 and the anal ray counts III.20-21.

*Acanthurus glaucopareis* (Bloch Schneider).

Ikan Babi.

3 specimens ranging from 134 to 164 mm.

Marshall (1950) draws attention to the existence of two colour phases in this species. These two phases are present in the Christmas Island specimens, the two smaller examples showing the typical colour pattern for the species. The largest specimen, representing the second colour phase, appears to differ from the normal form in that there is no abrupt line of demarcation at the commencement of the caudal fin between the darker pigmentation of the body and the lighter colour of the fin. In this second phase the colours gradually merge over the first third of the caudal fin. In addition, the ground colour of the dorsal and anal fins is a good deal lighter than that of the normally coloured specimens. Apart from colour, no essential differences have been found between the specimens.

*Ctenochaetus strigosus* (Bennett).

2 specimens of 152 and 164 mm.

Order SCLEROPAREI

Suborder Scorpaenoidea

Family Scorpaenidae

*Pterois volitans* (Linnaeus).

*Pterois volitans* Regan Proc. Zool. Soc. London, 1909, p. 404.

1 specimen of 183 mm.

Previously recorded from Christmas Island.

*Pterois radiata* C. V.

Ikan Jaha.

1 specimen of 156 mm.

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Order PLECTOGNATHI

Family Ballistidae

*Melichthys radula* (Solander).

2 specimens of 134 and 136 mm.

Additional species, listed from specimens in the British Museum collection, which have not previously been reported from Christmas Island.

Order APODES

Family Muraenidae

*Muraena picta* Ahl.

*Gymnothorax meleagris* (Shaw).

*Gymnomuraena macrocephalus* Bleeker.

*Gymnomuraena marmorata* Lacépède.

Order SYNENTOGNATHI

Family Belonidae

*Strongylura annulatus* (C. V.).

Family Exocoetidae

*Cypsilurus oxycephalus* (Bleeker).

Order SOLENICHTHYES

Family Aulostomatidae

*Aulostoma valentini* (Bleeker).

Order PERCOMORPHI

Suborder Percoidea

Division Perciformes

Family Carangidae

*Trachinotus bailleni* (Lacépède).

Family Pempheridae

*Pempheris otaitensis* Lesson.

Mus. 23, 1950.

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Family Chaetodipteridae

*Platax teira* (Forsk.)

Family Chaetodontidae

*Forcipiger longirostris* (Broussonnet).

*Pomacanthus imperator* (Bloch).

Division Pomacentriformes

Family Pomacentridae

*Abudefduf notatus* (Day).

Division Labriformes

Family Labridae

*Thalassoma hardwicki* (Bennett).

*Pseudojulis notospilus* Günther.

*Stethojulis strigiventer* (Bennett).

*Gomphosus tricolor* Quoy and Gaimard.

Suborder Acanthuroidea

Family Acanthuridae

*Acanthurus guttatus* Bloch Schneider.

Suborder Gobioidae

Family Eleotridae

*Bunaka gyrinoides* (Bleeker).

*Eviota epiphanes* Jenkins.

Suborder Blennioidea

Family Blenniidae

*Salarias tridactylus* Günther.

*Andamia heteroptera* (Bleeker).

FISH OF CHRISTMAS ISLAND

Suborder Mugiloidea

Family Mugilidae

*Mugil crenilabis* Forskal.

Order HETEROSOMATA

Family Bothidae

*Bothus mancus* (Broussonnet).

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